
Help with RasterLayerExport::Extent

Posted by Scott Davis - 2008/06/20 09:58

Any help would be greatly appreciated. I've been staring at this code for a while and can't figure out what's wrong.

I'm trying to export a raster layer as a .tif file clipped to the extent of the dataframe. When I run the code I don't get any error messages, but the .tif file that it starts to generate grows to well over 1 gig and doesn't show any sign of stopping. When I export the data through ArcMap (right-click on raster layer and choose Data -> Export Data...) on the same extent, the resulting file is only a few megs. This makes me think that my code is trying to export the full extent of the layer instead of clipping it to the current visible extent. Any ideas on what I'm doing wrong?

Thanks, in advance.

Scott

P.S. "Setup" gets run with the OpenDocument event and "ExportToTif" gets run with a UI button.

Option Explicit

Private pAV As IActiveView
Private pRLEExport As IRasterLayerExport
Private pWorkspace As IRasterWorkspace

Public Sub Setup()

' get layer
Dim pMxDoc As IMxDocument
Set pMxDoc = ThisDocument

Dim pMap As IMap
Set pMap = pMxDoc.FocusMap
Set pAV = pMap 'QI

Dim pLayer As ILayer
Set pLayer = FindLayer("Aerials", pMap)

Dim pRasterLayer As IRasterLayer
Set pRasterLayer = pLayer

' get raster layer export coclass
Set pRLEExport = New RasterLayerExport

Set pRLEExport.RasterLayer = pRasterLayer

' get workspace
Dim pWsFact As IWorkspaceFactory
Set pWsFact = New RasterWorkspaceFactory
Set pWorkspace = pWsFact.OpenFromFile("C:\Temp", 0)

End Sub

Public Sub ExportToTif()

' set extent
pRLEExport.Extent = pAV.Extent.Envelope

' export
Dim pRDataset As IRasterDataset
Set pRDataset = New RasterDataset

Set pRDataset = pRLEExport.Export(pWorkspace, "testname.tif", "TIFF")

End Sub

Private Function FindLayer(strSearch As String, pMap As IMap) As ILayer

```
Dim intPosition As Integer
Dim strName As String
Dim i As Integer
Dim bFound As Boolean
```

```
'loop through all layers
For i = 0 To pMap.LayerCount - 1
    strName = pMap.Layer(i).Name
    If (strName = strSearch) Then
        intPosition = i
        bFound = True
    End If
Next i
```

```
'check to see if layer was found
If Not bFound = True Then
    MsgBox strSearch & " layer not found.", vbCritical, "Error"
    Set FindLayer = Nothing
    Exit Function
End If
```

```
'get layer
Set FindLayer = pMap.Layer(intPosition)
```

```
End Function
```

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Re:Help with RasterLayerExport::Extent

Posted by Bert Granberg - 2008/06/23 12:51

Scott,

Did you try setting .spatial reference property or using the .setsize method to control for the output pizel size? Just a few guesses...not sure if they are going anywhere.

Bert

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Re:Help with RasterLayerExport::Extent

Posted by Scott Davis - 2008/06/23 13:54

I've tried both of the suggestions with no luck. Thanks for the guesses, Bert. For some reason the extent is not being set properly.

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Re:Help with RasterLayerExport::Extent

Posted by Bert Granberg - 2008/06/23 14:07

Have you tried setting pAV within the scope of the ExportToTif procedure??

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Re:Help with RasterLayerExport::Extent

Posted by Scott Davis - 2008/06/23 15:37

Yes, I had previously tried it as one procedure and it didn't work. I just tried it again just to be sure with no luck.

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Re:Help with RasterLayerExport::Extent

Posted by Bert Granberg - 2008/06/23 16:19

One more thing to try and then I give up...have you tried defining the extent manually...

```
Dim env as IEnvelope
Set env = new Envelope
env.PutCoords(400000, 4500000, 401000, 4501000)
```

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Re:Help with RasterLayerExport::Extent

Posted by Scott Davis - 2008/06/24 10:09

Still no luck. Thanks for the help, Bert. When I figure this out I will post the solution.

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